

Appl. No. : 10/568,792
Amdt. Dated: August 19, 2008
Reply to Office Action of April 24, 2008

RECEIVED
CENTRAL FAX CENTER
AUG 19 2008

AMENDMENTS

To the Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application:

1. (Previously presented) A method for fire-fighting, the method comprising:
piercing a shell of a burning object by pushing at least one elongated piercing tool
arranged in a rescue boom from the side of a first surface of the shell to the side of a second
surface thereof,
feeding, along at least one longitudinal channel in the piercing tool, a fire extinguishing
medium to a nozzle provided in the piercing tool,
spraying the fire extinguishing medium to the side of the second surface of the shell
through a plurality of orifices provided in the nozzle,
and directing a plurality of single jets expelled from the orifices so that they form a single
uniform jet having a flat curtain-like shape.
2. (Previously presented) A method as claimed in claim 1, comprising
using at least one curtain-like jet in order to confine a seat of fire.
3. (Previously presented) A method as claimed in claim 1, comprising
turning the nozzle around the longitudinal axis of the piercing tool in order to turn the
curtain-like jet.
4. (Previously presented) A method as claimed in claim 1, comprising
turning the piercing tool around its longitudinal axis in order to turn the curtain-like jet.
5. (Previously presented) A rescue boom comprising:
a boom provided with at least one movable boom part connected to a base,

Appl. No. : 10/568,792
Amdt. Dated: August 19, 2008
Reply to Office Action of April 24, 2008

at least one piercing tool arranged at a free end of the boom, the piercing tool being an elongated piece comprising at least one longitudinal channel,

at least one actuator for moving the piercing tool in the longitudinal direction of the piercing tool with respect to an outermost end of the boom,

at least one feed channel for feeding a fire extinguishing medium to the channel in the piercing tool,

at least one nozzle, which is an elongated piece and which is connected to the channel in the piercing tool, the fire extinguishing medium being arranged to be fed through a plurality of orifices provided in the nozzle,

and wherein the longitudinal cross section of the nozzle, the orifices in the nozzle are arranged to pass via substantially the same imaginary plane so that the fire extinguishing medium fed through the orifices is arranged to form a single uniform jet having a flat curtain-like shape.

6. (Previously presented) A rescue boom as claimed in claim 5, wherein means are provided in connection with the piercing tool for turning the curtain-like jet expelled from the nozzle with respect to the longitudinal axis of the piercing tool.

7. (Previously presented) A nozzle of a piercing tool for spraying a fire extinguishing medium, the nozzle being an elongated piece having a front end and a rear end and the nozzle comprising:

fastening means at the rear end of the nozzle for fastening the nozzle to the piercing tool,

at least one feed channel for feeding a fire extinguishing medium to the nozzle,

a plurality of orifices extending from the feed channel to an outer surface of the nozzle,

the orifices being directed obliquely forwards such that the farther away from the front end of the

Appl. No. : 10/568,792
Amdt. Dated: August 19, 2008
Reply to Office Action of April 24, 2008

nozzle a single orifice resides, the larger an acute angle between the middle axis of the orifice and the middle axis of the nozzle

and wherein the longitudinal cross section of the nozzle, the orifices are arranged to pass via substantially the same imaginary plane so that the fire extinguishing medium fed through the orifices is arranged to form a single uniform jet having a flat curtain-like shape.

8. (Previously presented) A nozzle as claimed in claim 7, wherein

the cross section of the single orifices in the nozzle is dimensioned to be the larger the smaller the angle between the middle axis of the orifice and the middle axis of the nozzle so that the curtain-like jet is arranged to extend to a larger distance at the front of the nozzle than on the sides of the nozzle.

9. (Previously presented) A nozzle as claimed in claim 7, wherein

the nozzle is a sleeve-like piece,

and the front end of the nozzle is provided with connecting means for fastening a separate tip piece.

10. (Previously presented) A nozzle as claimed in claim 7, wherein

in the longitudinal cross section of the nozzle, the orifices are arranged successively in a first line of orifices and in a second line of orifices, and

the first line of orifices resides on a first side of the middle axis of the nozzle while the second line of orifices resides on a second side of the middle axis thereof so that the nozzle is arranged to form a uniform, curtain-like jet extending to the sides and to the front of the nozzle.

11. (Previously presented) A nozzle as claimed in claim 7, wherein

in the longitudinal cross section of the nozzle, the orifices are arranged successively in a first line of orifices and in a second line of orifices,

Appl. No. : 10/568,792
Amdt. Dated: August 19, 2008
Reply to Office Action of April 24, 2008

and the first line of orifices resides on a first side of the middle axis of the nozzle while the second line of orifices resides on a second side of the middle axis thereof so that the nozzle is arranged to form a uniform, curtain-like jet extending to the sides and to the front of the nozzle,

and the outer surface of the nozzle is provided with at least one longitudinal groove at the first line of orifices and at least one longitudinal groove at the second line of orifices.

12. (Previously presented) A nozzle as claimed in claim 7, wherein

in the longitudinal cross section of the nozzle, the orifices are arranged successively in a first line of orifices and in a second line of orifices,

and the first line of orifices resides on a first side of the middle axis of the nozzle while the second line of orifices resides on a second side of the middle axis thereof so that the nozzle is arranged to form a uniform, curtain-like jet extending to the sides and to the front of the nozzle,

and the outer surface of the nozzle is provided with at least one longitudinal groove at the first line of orifices and at least one longitudinal groove at the second line of orifices,

and two longitudinal grooves are provided successively both at the first line of orifices and at the second line of orifices,

and as seen from the front end of the nozzle, the first grooves extend to a section of the first orifices as seen from the front end of the nozzle only.

13. (Previously presented) A nozzle as claimed in claim 7, wherein

in the longitudinal cross section of the nozzle, the orifices are arranged successively in a first line of orifices and in a second line of orifices,

and the first line of orifices resides on a first side of the middle axis of the nozzle while the second line of orifices resides on a second side of the middle axis thereof so that the nozzle is arranged to form a uniform, curtain-like jet extending to the sides and to the front of the nozzle,

Appl. No. : 10/568,792
Amdt. Dated: August 19, 2008
Reply to Office Action of April 24, 2008

and the outer surface of the nozzle is provided with at least one longitudinal groove at the first line of orifices and at least one longitudinal groove at the second line of orifices,

and the shape of the bottoms of the grooves in the outer surface of the nozzle is inwardly curved.

14. (New) A method as claimed in claim 1, further comprising the step of extending a curtain-like flat jet to the front of the piercing tool.

15. (New) A rescue boom as claimed in claim 5, wherein the orifices of the nozzle are directed obliquely forward.